Historic, archived document

Do not assume content reflects current scientific knowledge, policies, or practices.

1.941
SF3

LIBRARY
CURRENT SERIAL RECORD
APR 13 1944
U. S. DEPARTMENT OF AGRICULTURE

THE Feed SITUATION

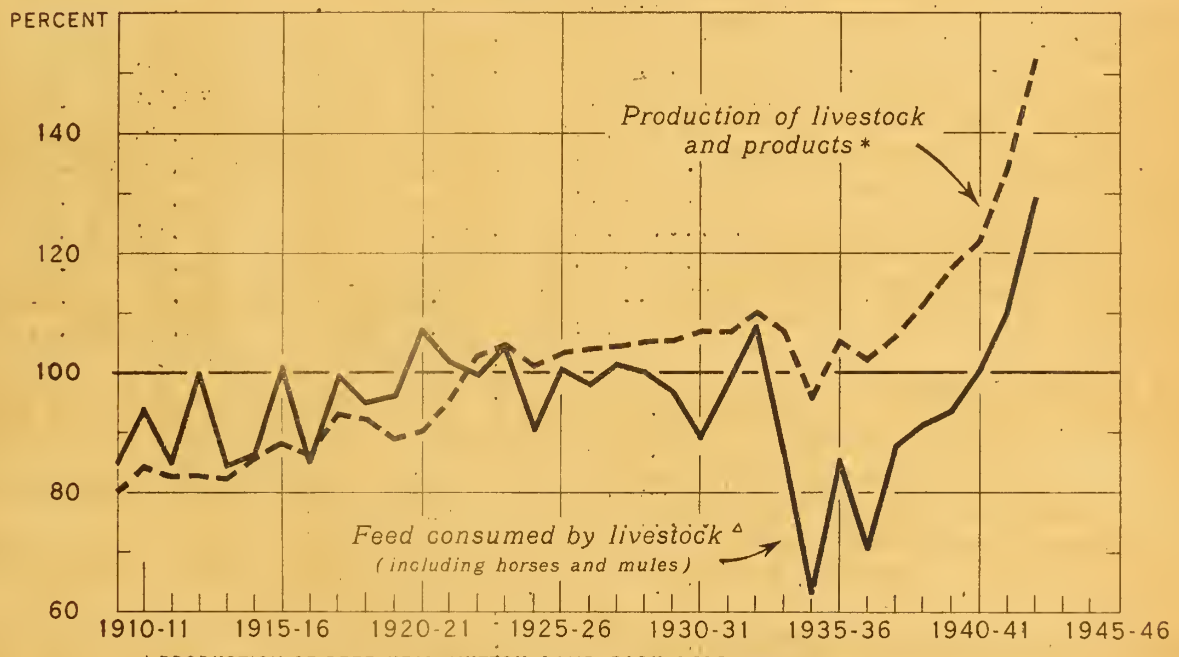
BUREAU OF AGRICULTURAL ECONOMICS
UNITED STATES DEPARTMENT OF AGRICULTURE

FdS-42 BAE JANUARY 1943

In this issue:
A COMPARISON OF FEED CONSUMPTION AND LIVESTOCK PRODUCTION, 1909-42

FEED CONSUMED BY LIVESTOCK, AND PRODUCTION OF LIVESTOCK AND LIVESTOCK PRODUCTS, UNITED STATES, 1909-42

INDEX NUMBERS (1920-29=100)



* PRODUCTION OF BEEF, VEAL, MUTTON, LAMB, PORK, LARD, POULTRY, EGGS, AND MILK; CALENDAR YEAR FOLLOWING

△ FEED GRAINS, WHEAT, RYE, WHEAT MILLFEEDS, OILCAKE AND MEAL, AND GLUTEN FEED
DATA FOR 1942-43 ARE ESTIMATED

U. S. DEPARTMENT OF AGRICULTURE NEG. 42844 BUREAU OF AGRICULTURAL ECONOMICS

The decline in the number of horses and mules on farms since World War I has made available more feed for the production of meat, milk, poultry, and eggs. Larger production of alfalfa hay and oilcake and meal in recent years also has contributed to the increase in the production of livestock products in relation to total concentrates fed. (For data see table 7).

Table 1.- Ma[illegible]et prices of feeds and livestoc[illegible]feed price ratios, January 1941, 1942, and November 1942-January 1943

Item	Unit	Jan. 1941	Jan. 1942	1942-43 Nov.	1942-43 Dec.	1942-43 Jan. 1
		Cents	Cents	Cents	Cents	Cents
Grains						
Corn No. 3 Yellow, Chicago	Bu.	63.6	81.8	80.5	89.4	96.9
No. 3 Yellow, Kansas City	"	58.9	79.1	79.3	85.6	92.6
Oats No. 3 White, Chicago	"	38.2	57.8	49.8	53.6	57.2
No. 3 White, Minneapolis	"	35.0	54.3	45.5	50.0	56.9
Barley No. 3, Minneapolis	"	52.7	76.2	65.0	73.8	79.1
Wheat No. 2 Hd. Winter, Kansas City	"	84.7	125.6	123.1	130.5	136.2
Rye No. 2, Minneapolis	"	52.6	80.3	59.3	70.3	73.5
Byproduct Feeds						
Standard bran, Minneapolis	Ton	21.60	33.30	32.10	35.80	36.25
Chicago	"	23.30	35.25	33.90	37.45	38.40
Buffalo	"	25.05	37.40	36.25	40.40	41.50
Standard middlings, Minneapolis	"	21.60	33.55	32.95	35.95	36.00
Chicago	"	23.50	35.55	34.95	37.75	38.25
Buffalo	"	24.55	37.00	36.75	40.05	40.50
Cottonseed meal, 41 pct. protein, Chicago	"	34.50	46.10	45.40	46.90	46.75
41 pct. protein, Memphis	"	27.85	39.90	38.60	38.65	38.75
Linseed meal, 34 pct. protein, Minneapolis	"	2/29.50	39.50	39.75	42.80	43.00
30-32 pct. protein, San Francisco	"	29.50	39.75	42.00	45.00	48.00
Peanut meal, 45 pct. protein, S. E. milling points	"	21.95	44.10	39.10	38.00	38.00
White hominy feed, Chicago	"	24.80	33.75	33.10	35.70	41.00
Gluten feed, 23 pct. protein, Chicago	"	25.20	30.20	32.25	32.50	32.50
Tankage, digester, 60 pct., Chicago	"	48.10	76.90	3/71.05	3/71.05	3/71.05
Meat scraps, Chicago	"	44.40	73.75	3/68.00	3/68.00	3/68.00
Fish meal, San Francisco	"	51.25	75.95	79.50	79.50	79.50
Brewers' dried grains, Milwaukee	"	24.50	35.50	32.40	36.00	37.00
Distillers' dried grains, Cincinnati	"	29.10	39.90	39.10	42.50	---
Alfalfa meal, No. 1 fine, Kansas City	"	22.10	30.70	32.90	32.90	32.90
		Pct.	Pct.	Pct.	Pct.	Pct.
Indexes of Feed Prices 4/						
Feed grains, United States, 1910-14 = 100		85	115	115	122	5/ 133
Oilseed meal, terminal markets, 1935-39 = 100		99	142	137	6/139	6/7/137
Livestock byproduct feeds and fish meal, terminal markets, 1935-39 = 100		105	165	8/160	8/160	7/8/160
Ten principal high-protein feeds, terminal markets, 1935-39 = 100 9/		101	145	8/141	8/143	7/8/142
Indexes of Livestock-Feed Price Ratios 10/						
Hog-corn ratio, Chicago, 1920-39 = 100		103	118	144	137	11/128
Beef-corn ratio, Chicago, 1920-39 = 100		138	113	125	116	11/112
Butterfat-feed ratio, United States, 1920-39 = 100		99	88	106	105	5/104
Egg-feed ratio, United States, 1931-40 = 100		83	96	86	86	5/104

1/ Grain prices, average for week ended January 16, byproduct feed prices as of January 12. 2/ 37-percent protein. 3/ Bulk. 4/ For method and data for earlier months and years see issues of "The Feed Situation" for December 1941 and April 1942. 5/ Preliminary. 6/ Partly estimated. 7/ January 12. 8/ Includes some prices for bulk sales. 9/ Revised to exclude copra meal. 10/ Average for corresponding month in base period = 100. Index numbers above 100 indicate that ratios are favorable to livestock producers. See table 1, "The Feed Situation," February 1942. 11/ Week ended January 16.

THE FEED SITUATION

Summary

Total disappearance of feed grains during 1942-43 probably will be 12 to 14 percent greater than in 1941-42. The carry-over of corn at the end of the marketing year is expected to be about the same as in 1942 and the carry-over of oats and barley may be a little larger. Production of the four feed grains in 1943 will be somewhat smaller than in 1942, if 1943 goals are attained and yields are about the same as the average for the past 5 years. Allowing for a further increase in livestock numbers, the supply of feed grains in 1943-44 may be about 10 to 15 percent smaller per grain-consuming animal unit than in 1942-43. To aid in meeting this situation farmers are now permitted to overplant their corn allotment without penalty, provided they have planted their goal of war crops. The 1943 corn loan rate will be available in all parts of the country where farm storage is feasible.

Disappearance of corn and oats during October-December was 16 percent larger than in the corresponding quarter of 1941. Stocks of these two grains on January 1 were about 9 percent larger than on January 1 last year. With the rate of wheat feeding increased considerably in recent weeks, it is expected that the 125 million bushels allocated by the Government for sale during 1942-43 will be sold before the close of the marketing year.

Buyers of oilcake and meal continue to take all supplies of these feeds as rapidly as they become available. Some loosening of the supply situation is in prospect this summer when dairy cattle are turned on pasture and more of these feeds will be available for hogs and poultry, but the carry-over into 1943-44 may be small. Supplies of all high-protein feeds, including animal proteins, have increased at about the same rate as livestock production in the last 2 or 3 years. In 1943-44, however, supplies of all protein available for feeding may be somewhat smaller than this season, in relation to livestock numbers.

Maximum price regulations establishing ceilings on corn prices and on the margins of producers, wholesalers, and retailers of mixed feeds were announced by the Office of Price Administration this month. Ceilings on corn prices were established at all primary and local markets generally at the highest level at which corn sold on January 11. These ceilings were established by a 60-day freeze regulation, which will be followed by a permanent order. Corn prices have increased about 24 cents a bushel since late October. No. 3 Yellow corn reached $1 per bushel at Chicago on January 11, at which price the ceiling became effective.

The ceilings on margins of feed mixers are based on margins during specified months of 1942. A flat margin of $2.50 a ton for wholesalers and of $7.50 a ton for retailers was set on these feeds. This regulation will tend to make feed ingredients (including oilmeals) available to farmers at prices not greater than the maximum prices for these feeds, plus mixing and handling costs.

-- January 20, 1943

REVIEW OF RECENT DEVELOPMENTS

BACKGROUND.- Feed supplies in the last 3 years have been much larger than average because of favorable growing seasons, the shift from open-pollinated to hybrid corn, and the large carry-over from earlier years. Because of the marked increase in livestock production, demand has been strong and utilization of feed has increased sharply. Much of the corn that was owned by the Government early in 1941 has been sold. Prices of feed grains increased considerably since the war began, but large supplies have kept feed prices low in relation to livestock prices during most of the last year.

Utilization of Feed Unusually Large During the Last Quarter of 1942

Liberal feeding of the large number of livestock on farms resulted in very heavy disappearance of all kinds of feed during October-December 1942. The combined disappearance of corn as grain and oats was 16 percent larger than in the last quarter of 1941, and was the largest in any of the 16 years for which records are available. Disappearance of corn, including corn used industrially, totaled 1,031 million bushels, 138 million bushels more than in the last quarter of 1941. Disappearance of oats was 18 percent larger than a year earlier.

Data are not available on utilization of barley and grain sorghums, but these also probably were fed liberally in the last quarter of 1942. In addition to the four feed grains, about 38 million bushels of wheat were sold for feeding. and the apparent disappearance of wheat millfeed was 6 percent larger than in the corresponding period of the previous year.

January 1 Stocks of Corn and Oats 9 Percent Greater Than a Year Earlier

Stocks of corn and oats combined on January 1 amounted to 9 percent more than on January 1 a year earlier and were the largest in recent years. Taking into account the larger quantities of wheat available for feeding, and the possibility of increased imports of corn and oats from Canada, supplies of feed per grain-consuming animal unit for the first half of 1943 are about as large as in the first half of 1942.

Stocks of corn on January 1, including corn owned by the Government, totaled 2,346 million bushels. Only 31 million bushels of these stocks were owned by the Government, less than one-fourth as much as on January 1, 1942. Of the 2,277 million bushels on farms on January 1, 1943, about 105 million bushels were under seal, leaving 2,172 million bushels of "free corn," 381 million bushels more than on January 1 a year earlier.

Table 2.- Distribution of the January 1 stocks, averages 1929-33 and 1938-42, annual 1940-43

Position	Average: 1929-33	Average: 1938-42	1940	1941	1942	1943
	Million bushels	Million bushels	Million bushels	Million bushels	Million bushels	Million bushels
Stocks on farms:						
Sealed	---	161	187	292	225	105
Unsealed	1,471	1,691	1,727	1,546	1,791	2,172
Total	1,471	1,852	1,914	1,838	2,016	2,277
Other stocks:						
Owned by the Government						
Terminal elevators	---	22	11	57	19	6
Steel bins	---	48	54	79	106	22
Country or sub-terminal elevators	---	17	32	45	12	3
Total	---	87	97	181	137	31
Commercial stocks unsealed	18	29	35	13	29	38
Total stocks	1,489	1,968	2,046	2,032	2,182	2,346

Maximum Price Established for Corn at Highest Level on January 11

Price ceilings for corn, effective January 13, have been announced by the Office of Price Administration, on all exchanges and in every cash and local market, generally at the highest prices at which corn sales were made on January 11, 1943. The ceilings established by means of a 60-day freeze regulation, will be continued in a later permanent order.

Ceilings were established at recognized cash markets and at the three futures markets -- Chicago, Kansas City, and Minneapolis -- at the highest levels reached on January 11. In addition to the three markets mentioned above recognized cash markets include, but are not confined to, Omaha, Sioux City, St. Louis, Memphis, Cairo, Peoria, Cincinnati, Buffalo, San Francisco, Indianapolis, Portland, Ore., Baltimore, Philadelphia, and Boston. Highest cash and future prices at some of these markets on January 11 are shown in the table below.

Table 3.- Corn: Highest prices of reported cash and future sales per bushel, at specified markets, January 11, 1943

Market	Cash sales					
	Yellow corn			White corn		
	No. 2	No. 3	No. 4	No. 2	No. 3	No. 4
	Cents	Cents	Cents	Cents	Cents	Cents
Chicago 1/	101-3/4	100	100-1/2	117	109-1/2	108
Kansas City	2/ 96-1/4	92-3/4	92	2/111-3/4	106	106
Minneapolis	95-1/8	93-1/4	92-5/8			95
St. Louis 1/	100-1/2	100	98	116-3/4	115-1/2	113-1/2
Omaha	91	90		107	106	103
Peoria 1/	100	97	95-1/2			
St. Joseph	95	93-1/2	91	109	107-1/2	106
Buffalo	2/107-1/8	2/106-5/8				
New York	2/115-7/8	2/114-7/8				

Market	Futures			
	May	July	Sept.	Dec.
Chicago	100	100-3/8	100-7/8	100-7/8
Kansas City	96-3/4	97-1/2	---	---
Minneapolis	93-7/8	---	---	---

1/ Maximum prices listed by Board of Trade.
2/ Quotations.

On cash corn prices at recognized markets maximum prices will be the top prices for which No. 2 Yellow corn sold on January 11, with premiums or discounts above or below this price for every other grade, reflecting the differences in sales prices which prevailed on that date. If no sales were made on January 11 on any particular class and grade, the maximum price is based on the highest price for the best class which did sell and the differential between these on the most recent day on which both sold in that market. The prices shown in table 3 may differ slightly from the maximum prices established for these markets, since the highest sale prices on January 11 may have been slightly above or below the highest quotation, except for Chicago, St. Louis, and Peoria, where the prices shown are maximum prices which have been established by the Board of Trade.

On cash corn in local markets the ceiling is either (1) the maximum price at which the seller did business during the 5-day period from January 8 to 12, or (2) the highest price at which the seller offered during that same period, or (3) the maximum price during such period at the nearest recognized grain market or source of supply, plus the charge at the carload rail rate -- flat or proportional, whichever is appropraite -- from the recognized market to the local market.

Sales of Feed Wheat During December Exceed 18 Million Bushels

Sales of Government feed wheat have increased sharply during recent weeks as advances in prices of other feeds have made feed wheat a comparatively cheap feed in many areas. During December, 18.3 million bushels of wheat were sold for feed, the largest monthly total since the sale program became effective early in 1942. The quantity of wheat sold from July 1, 1942 through January 5, 1943 totaled 68 million bushels, leaving 57 million bushels yet to be sold from the 125 million bushels of wheat allocated for feeding during 1942-43. If the present rate of feeding continues, this will be sold somewhat before the close of the current wheat marketing year.

Allowing for advances in corn prices since mid-December, the average local market price of corn is estimated to be above the sale price of wheat in nearly all States. In the Corn Belt and in the South Central States, the price of feed wheat about the middle of January was 5 to 10 cents per bushel below the local market price of corn. In the Southeast feed wheat was 10 to 15 cents per bushel below corn prices, and on the Pacific Coast feed wheat was 10 to 20 cents per bushel below.

Price Ceilings Established For Mixed Livestock Feeds

Price ceilings on mixed feeds have been announced by the Office of Price Administration, effective January 22, at producer, wholesaler, and retailer levels. The ceiling for the manufacturer is the cost of ingredients, plus his average margin during January, March, May, October, November, and December 1942. This provision may be succeeded by fixed dollars and cents mark-ups for each class of manufacturer after these margins have been reported to OPA. Wholesalers of mixed feeds are allowed a $2.50 per ton mark-up as their ceiling, and retailers are allowed a $7.50 per ton mark-up. As the prices of feed ingredients not covered by price ceiling advance, the price of mixed feed will increase accordingly, but the manufacturers' margin will not change. It is also provided in this order that no feed manufacturer may calculate any ingredient in his mixed feed costs at a higher price than the maximum price fixed for that ingredient.

Sales of mixed feeds have been exceptionally large during the present feeding season, reflecting the large production of livestock and the favorable level of livestock prices.

About 27 Million Bushels of 1942 Corn Sealed by mid-January

The quantity of 1942 corn sealed from December 1 through the middle of January totaled 27 million bushels, about 13 million bushels less than in the corresponding period of 1941-42. The smaller volume sealed in December-January, as compared with a year earlier, reflects stronger demand for corn than a year ago in the surplus corn States and higher corn prices.

In mid-December the price of corn in the four surplus producing States, in which 90 percent of all corn sealed in the United States in recent years has been produced, was 0 to 5 cents per bushel below the loan rate, compared with 9 to 13 cents below a year earlier. Increases in corn prices since December probably have brought corn prices above the loan rate in these States and near or above the loan rate in most other sections of the Corn Belt.

Prices of Feed Grains Advance During Past Month; Byproduct Feeds Generally at Ceilings

The price of No. 3 Yellow corn at Chicago advanced from 88 cents per bushel about the middle of December to a top price of $1 per bushel on January 11, at which level a ceiling was established by the Office of Price Administration. From late in October to January 11, No. 3 Yellow corn advanced 24 cents per bushel at Chicago. Since January 11, corn prices at Chicago have remained within 2 or 3 cents of the ceiling price, and at the highest level since September 1937. Market prices of oats and barley increased 3 to 6 cents per bushel from about the middle of December to the middle of January. Strong demand, resulting from larger numbers of livestock on farms and favorable feeding ratios, is largely responsible for higher feed-grain prices.

Prices of wheat millfeeds in mid-January were 50 cents to $1.00 per ton below the high points reached in the second half of December at most markets, and are $1.00 to $1.75 below the ceilings at Kansas City and Minneapolis. Prices of oilcake and meal, on the other hand, remain at the maximum levels, with practically no offerings at wholesale markets.

The 1943 Goal for Corn Increased

To provide more feed for further expansion of livestock production in 1943-44, several changes in the Farm Program have been announced by the Secretary of Agriculture. The most significant of the new provisions permits farmers in the commercial corn area to overplant their corn allotment without penalty, provided they have planted up to their goal of war crops. Loans will be offered on 1943 corn to producers who meet their war crop goals.

To stimulate corn production further in noncommercial corn areas, the 1943 loan rate will be available at the full rate in all parts of the country where farm storage is feasible.

To encourage barley production the Department of Agriculture will support the price of barley from the 1943 crop at a level equal to its feeding value in relation to corn. The barley-support program also will be available only to those farmers who meet their war goals.

OUTLOOK

Strong Demand for Oilmeal Continues; Some Loosening of Oilmeal Supplies in Prospect This Spring and Summer

The strong demand for oilmeal which has been in evidence since last fall continues throughout the country, with feed mixers and livestock and poultry producers taking all supplies of these feeds as rapidly as they become available. It is estimated that production of oilcake and meal from the four principal oilseeds — cottonseed, linseed, soybeans, and peanuts — will be about 40 to 50 percent larger in the current quarter than in the corresponding period of 1942.

In April-June, production of these feeds may be nearly double that in the corresponding quarter last year. The quantity of these feeds fed to dairy cattle will be reduced during the late spring and summer months as dairy cows are turned on pasture. This reduction will make more feed available for hogs and poultry and result in some loosening of the oilmeal supply situation in this period. Nevertheless, increases in prices of corn and other feeds since last fall have made prices of oilmeal cheaper than in the fall in relation to other feeds. Oilmeal also is cheap in relation to livestock products. These factors, together with limited supplies of animal-protein feeds, probably will result in very little seasonal decline in prices of these feeds this summer and in little accumulation of stocks this summer for carry-over into the 1942-43 marketing season.

Table 4.- High-protein feeds: Supply and disappearance for livestock feed, United States, 1937-42

Year beginning October 1 1/	Oilcake and meal: Cottonseed 2/	Oilcake and meal: Soybean 3/	Oilcake and meal: Linseed 3/	Oilcake and meal: Peanut 2/	Oilcake and meal: Total	Copra cake and meal 3/	Gluten feed and meal 4/	Brewers' and distillers' dried grains 4/	Total eight feeds, oilmeal equivalent
	1,000 tons	1,000 tons	1,000 tons	1,000 tons	1,000 tons	1,000 tons	1,000 tons	1,000 tons	1,000 tons
	Supply								
Average 1937-41	2,238	1,315	619	78	4,250	135	689	303	4,995
1941	1,952	5/1,825	5/891	70	4,738	79	962	437	5,720
1942	2,300	3,800	850	200	7,150	35	960	540	8,167
	Apparent disappearance as livestock feed								
Average 1937-41	1,957	1,286	481	74	3,798	135	689	303	4,543
1941	1,722	1,825	891	67	4,505	79	962	437	5,487
1942	2,100	3,500	850	190	6,640	35	960	540	7,657

Apparent disappearance of animal proteins for livestock feed

Calendar years	Tankage and meat scraps 3/ 6/	Fish meal 3/	Skim milk, dry weight equivalent	Total oilmeal equivalent
	1,000 tons	1,000 tons	1,000 tons	1,000 tons
Average 1938-42	525	229	1,617	3,072
1942	600	180	1,474	2,939
1943	650	125	1,410	2,855

1/ Cottonseed meal year beginning August 1. Brewers' and distillers' grains year beginning July 1.
2/ Production plus imports and carry-over.
3/ Production plus imports.
4/ Production.
5/ Does not include cake and meal exported.
6/ Estimated production in meat-packing industry.

The total supply of four principal oilcakes and meals for 1942-43 is estimated to be 7,150,000 tons -- 51 percent larger than the 1941-42 supply as shown in table 4. After allowing for the change in inventory of cottonseed and peanut cake and meal, cottonseed cake and meal used for fertilizer, and soybean meal used for food, the quantity of these feeds available for livestock feeding is expected to total about 6,640,000 tons, about 47 percent greater than in 1941-42. During 1943 an increasing quantity of soybean cake and meal will be used for making soya flour and other food products. The quantity so used in 1942-43 is expected to total about 200,000 tons.

It is probable that some soybean meal will be held over into 1943-44 for feeding, so that the quantity available for livestock feed in 1942-43 may be about 300,000 tons less than production, or approximately 3,500,000 tons. Production of peanut cake and meal has been small so far this season. Growers have been slow in marketing peanuts for crushing, but heavy marketings are expected toward the close of the marketing season.

The 1943 production of tankage and meat scraps at wholesale packing establishments is expected to be larger than that in 1942, since total livestock slaughter will be increased. Fish meal production, on the other hand, is expected to be much smaller, since operations of the fishing industry will be reduced, and a larger proportion of the catch will be used for food. The quantity of skim milk, both liquid and dried, available for livestock feeding also will be reduced in 1943. It is estimated that the supply of these four animal-protein feeds available for livestock feed in 1943 will be equivalent to about 2,855,000 tons of oilcake and meal, 3 percent less than the quantity fed in 1942.

Table 5.- Apparent domestic disappearance of 11 high-protein concentrates 1/ for livestock feeding, United States, 1937-43

Calendar year	Jan.-Mar.	Apr.-June	July-Sept.	Oct.-Dec.	Total	Livestock products 2/	Protein feed consumed per 100 pounds of livestock products
	1,000 tons	1,000 tons	1,000 tons	1,000 tons	1,000 tons	Billion pounds	Pounds
Average 1935-39	1,582	1,352	1,511	2,079	6,524	39.0	33
1940	1,853	1,559	1,631	2,407	7,450	44.0	34
1941	2,128	1,912	1,925	2,537	8,502	45.7	37
1942	2,138	1,912	2,031	2,794	8,875	50.2	35
1943	2,717	2,745	2,290	2,633	10,385	56.7	37

1/ Weighted as follows: Four oilseed cakes and meals 1.00, copra meal and brewers' and distillers' dried grains 0.6, gluten feed and meal 0.7, tankage, meat scraps, and fish meal 1.5, dried skim milk 1.2.
2/ Production of beef, veal, lamb, mutton, pork, lard, poultry, eggs, and dry weight equivalent of milk.

While the supply of oilcake and meal in 1942-43 is expected to be nearly 50 percent greater than in 1941-42, the increase in the supplies of all protein feeds will be much less than this and the increase relative to livestock production will be very small. The situation here is disclosed in table 5, which shows the estimated disappearance of 11 principal protein feeds, by quarters, totaled in tons equivalent to 1 ton of oilmeal. These totals indicate a 23 percent increase in supplies of all proteins available for feeding in the marketing year beginning October 1942, and an 18 percent increase in the calendar year 1943 over 1942. This is only slightly more than the increase expected in livestock production.

In 1943-44 supplies of high proteins available for feed may be somewhat smaller than in this season. A large quantity of soybean meal, possibly 500,000 tons or more, will be used for food, and production of cottonseed meal and fish meal may be smaller next year than this. Some further reduction in the quantity of skim milk fed in 1943-44 also is in prospect. With livestock numbers increasing, supplies of protein concentrates in 1943-44 may be considerably smaller in relation to livestock production than in 1942-43.

Demand for Feed to Continue Strong Throughout 1942-43

A strong demand for feed grains is expected to continue throughout the 1942-43 season, causing a record disappearance of feed grains. The combined disappearance of four feed grains and wheat fed to livestock probably will be 12 to 14 percent larger than in 1941-42. Estimated disappearance of corn, oats, and barley in 1942-43 as compared with 1941-42 is shown in table 6.

Table 6.- Feed grain: Supplies and disappearance, United States, 1941-43

Item	Corn		Oats		Barley	
	1941-42	1942-43	1941-42	1942-43	1941-42	1942-43
	Mil. bu.	Mil. bu.	Mil. bu.	Mil. bu.	Mil. bu.	Mil. bu.
Total supply 1/	3,323	3,668	1,405	1,553	432	507
Disappearance -						
Livestock feed 2/	2,527	2,862	1,081	1,200	246	302
Other uses	304	306	129	128	105	105
Total	2,831	3/3,168	1,210	3/1,328	351	3/407
Carry-over at close of year	492	3/ 500	195	3/ 225	81	3/100

1/ Production plus carry-over of corn October 1, oats July 1, barley June 1.
2/ Residual. 3/ Expected.

The disappearance of oats and barley in 1942-43 does not include imports of oats and barley from Canada, which may make somewhat larger supplies of feeds available for livestock feed or for carry-over than is indicated here. In addition to heavier feeding of these grains, about 100 million bushels more wheat and 15 million bushels more rye are expected to be fed during the current marketing year than in 1941-42.

The 1943 production of four feed grains will be about 8 percent smaller than in 1942, if 1943 acreage goals are attained and yields are about the same as the average of the past 5 years. Supplies will be correspondingly smaller, while livestock numbers may be up about 5 percent. This would make supplies per animal 10 to 15 percent smaller than for the current season. This may be offset in part by increased feeding of wheat and by importing oats and barley from Canada.

Larger Acreage of Feed Grains Needed in all Regions in 1943

With livestock production expanding and with smaller supplies of feed grains in prospect for 1943-44, a tightening of the feed situation is in prospect for next year in nearly all regions. Livestock producers in the Corn Belt may take a larger than usual proportion of the feed produced in this area, which will leave smaller quantities available for shipment to other regions. Farmers in other areas will have to depend more on locally grown grains and Government feed wheat for their feed supplies. To meet this situation it will be necessary for farmers in all areas to increase their acreages of feed grains as much as possible without curtailing acreages of war crops.

In the East North Central States, stocks of corn and oats combined on January 1 were 9 percent larger than a year earlier and were 14 percent larger in the West North Central States. In Iowa stocks were about the same as last year and in Illinois they were a little smaller. In all other Corn Belt States stocks of these grains were considerably larger than at the beginning of 1942. In the North Atlantic area stocks of these grains were 4 percent larger than a year ago, but in the Southern States they were about 3 percent smaller. The demand for byproduct feeds and commercially prepared feeds continues strong in all areas, with supplies of many ingredients, especially proteins, inadequate to meet the requirements of feeders.

A COMPARISON OF LIVESTOCK PRODUCTION AND FEED CONSUMPTION, 1909-42

The principal factors which stand out in a comparison of livestock production and feed utilization over the past 30 years are: (1) An increasing output of livestock products per unit of feed consumed; (2) a decline in numbers of horses and mules on farms; (3) more corn produced per acre because of increased use of hybrid seed; (4) increased production of alfalfa hay and larger supplies of oilcake and meal. These factors, together with favorable weather, have been important in making possible an expansion in production of livestock and livestock products without greatly expanding the acreage of feed grains.

Changes in production of livestock products and disappearance of feed grains and byproduct feeds are shown in table 7. In this table total pounds of meat, poultry products, and dry weight equivalent of milk in the calendar years 1910-43 are compared with total utilization of feed during the feed marketing years beginning in the preceding fall. This comparison shows that feeds consumed by livestock, including horses and mules, followed the same general upward course as livestock production until the early 1920's, when the downward trend in the number of horses and mules began to make larger quantities of feed available for the production of livestock products.

In the drought period 1934-36, feed consumption dropped sharply. Production of livestock products dropped somewhat less than feed utilization; but there was a marked decline in the quality of livestock products, since many meat animals were marketed without much grain feeding. Since the drought period, the quality of the livestock marketed has improved and in recent years it has been as good as during the period 1920-29. Consumption of feed relative to livestock production has averaged 20 to 25 percent smaller than in 1920-29, partly because of the reduction in numbers of horses and mules and partly because of improvement in feeding practices.

The percentage of digestible protein in the feed consumed by livestock increased somewhat from 1909 to 1930, but a more pronounced increase has occurred in the last 10 years. The large percentage increase in use of oilcake and meal has resulted in a comparatively small increase in total protein content of all feeds, however, as oilcake and meal make up a small part of the total feed supply. All feed consumed by livestock during 1942-43, including animal-protein feeds and brewers' and distillers' dried grains, will contain about 10.2 percent digestible protein, which is the highest content for any year except in the drought year 1936-37.

Output of livestock products per ton of feed consumed probably will continue greater in the next several years than in the 1920's. Further increases will depend on the increase or decrease in numbers of horses and mules, changes in production of protein feeds and alfalfa hay, and further technological developments which would improve the efficiency of producing livestock products.

Table 7.- Concentrates fed to livestock, livestock production, and horses and mules on farms, 1909-43

Marketing year 1/	Feed concentrates fed livestock					Percentage digestible protein including animal protein feeds and brewers' and distillers' dried grains 5/	Production of livestock and livestock products	Horses and mules on farms Jan. 1
	Six grains 2/	By-product feeds 3/	Total	Index 1919-20 to 1928-29 = 100	Percentage digestible protein 4/		Index 1920-29 = 100 6/	Index 1920-29 = 100
	Mil. tons	Mil. tons	Mil. tons	Pct.	Pct.	Pct.	Pct.	Pct.
1909-10	80.9	5.8	86.7	84.9	8.3		79.9	105.9
1910-11	89.7	6.2	95.9	93.9	8.3		84.0	108.6
1911-12	80.4	6.4	86.8	85.0	8.4		82.4	110.5
1912-13	95.3	6.7	102.0	99.9	8.4		82.7	112.3
1913-14	79.2	7.0	86.2	84.4	8.6		82.3	114.5
1914-15	80.8	7.4	88.2	86.4	8.6		85.8	115.8
1915-16	95.5	7.4	102.9	100.8	8.4		88.5	116.0
1916-17	79.7	7.3	87.0	85.2	8.7		86.6	116.6
1917-18	93.7	7.8	101.5	99.4	8.6		93.1	116.8
1918-19	89.4	7.6	97.0	95.0	8.7		92.4	115.8
1919-20	90.6	7.6	98.2	96.2	8.5		89.2	112.6
1920-21	102.7	6.8	109.5	107.2	8.4		90.3	109.9
1921-22	97.3	6.6	103.9	101.8	8.3		95.6	107.5
1922-23	94.3	7.4	101.7	99.6	8.4		102.8	105.0
1923-24	99.0	7.7	106.7	104.5	8.5		104.6	101.8
1924-25	84.5	7.9	92.4	90.5	8.8		101.0	98.7
1925-26	94.3	8.4	102.7	100.6	8.7		103.2	96.1
1926-27	91.6	8.7	100.3	98.2	8.8		103.9	92.7
1927-28	95.2	8.3	103.5	101.4	8.7		104.3	89.4
1928-29	93.7	8.5	102.2	100.1	8.8	9.4	105.0	86.3
1929-30	90.7	8.5	99.2	97.2	8.8	9.4	105.4	83.6
1930-31	82.9	8.4	91.3	89.4	9.1	9.7	107.0	80.7
1931-32	92.9	7.8	100.7	98.6	8.9	9.4	106.8	77.9
1932-33	102.7	7.4	110.1	107.8	8.6	9.2	109.9	75.8
1933-34	81.7	7.1	88.8	87.0	8.6	9.4	106.9	74.3
1934-35	57.5	7.2	64.7	63.4	9.1	9.9	96.1	72.9
1935-36	79.1	8.2	87.3	85.5	9.1	9.9	105.1	70.9
1936-37	63.8	8.6	72.4	70.9	9.5	10.4	102.2	69.1
1937-38	80.8	8.7	89.5	87.7	9.3	10.0	106.2	66.7
1938-39	84.7	8.8	93.5	91.6	9.2	10.0	111.5	64.7
1939-40	86.7	9.3	96.0	94.0	9.2	9.9	117.5	63.3
1940-41	92.3	10.2	102.5	100.4	9.4	10.1	122.1	61.8
1941-42	102.0	10.3	112.3	110.0	9.3	9.9	134.0	59.8
1942-43 7/	118.9	12.8	131.7	129.0	9.6	10.2	8/ 151.4	57.7

Continued -

Table 7.- Concentrates fed to livestock, livestock production, and horses and mules on farms, 1909-43 - Continued

1/ Corn marketing year beginning November 1909-25, and October 1926-42; oats - August 1909-25 and July 1926-42; barley - August 1909-33 and June 1934-42. Animal-protein feed disappearance and livestock production, calendar year following.
2/ Corn, oats, barley, grain sorghums, wheat, and rye.
3/ Apparent domestic disappearance of oilcake and meal, gluten feed, and wheat millfeeds. Data for years prior to 1926 partly estimated.
4/ Percentage digestible protein in feed fed (column 4).
5/ Tankage, meat scraps, fish meal, skim milk (dry and liquid), and brewers' and distillers' dried grains added to column 4.
6/ Early years partly estimated. Production of beef, veal, lamb, mutton, pork, lard, poultry, eggs, and dry weight equivalent of milk.
7/ Preliminary estimate.
8/ Based on 1943 goals.

Table 8.- Corn and oats: Stocks January 1, United States, by States and sections, 1938-43

Geographic division and State	Corn 1/			Oats			Total		
	Average: 1938-42	1942	1943	Average: 1938-42	1942	1943	Average: 1938-42	1942	1943
	Mil. bu.	Mil. bu.	Mil. bu.	Mil. bu.	Mil. bu.	Mil. bu.	1,000 tons	1,000 tons	1,000 tons
North Atlantic	48.9	51.1	52.0	42.8	43.6	47.4	2,056	2,128	2,215
Ohio	102.1	108.8	130.9	25.7	32.0	34.7	3,270	3,558	4,221
Indiana	130.2	129.2	161.4	25.5	33.6	31.3	4,054	4,156	5,021
Illinois	358.4	375.8	357.0	87.9	101.2	91.7	11,440	12,140	11,462
Michigan	31.4	28.2	47.4	32.4	33.0	47.2	1,399	1,317	2,082
Wisconsin	31.3	36.7	41.8	54.0	51.8	69.5	1,739	1,857	2,283
East North Central	653.4	678.7	738.5	225.5	251.6	274.4	21,902	23,028	25,069
Minnesota	130.2	153.7	144.7	106.4	80.2	124.1	5,348	5,586	6,038
Iowa	472.1	537.5	533.9	135.8	118.5	139.0	15,392	16,946	17,173
Missouri	95.8	93.3	119.8	30.2	35.2	39.2	3,167	3,177	3,984
North Dakota	3.7	7.6	6.8	28.7	45.3	58.4	562	939	1,125
South Dakota	30.9	38.5	68.0	32.4	40.1	64.2	1,384	1,719	2,930
Nebraska	102.0	160.9	206.9	27.3	37.3	41.0	3,292	5,103	6,448
Kansas	24.5	38.9	58.0	19.4	21.4	26.4	998	1,430	2,046
West North Central	859.2	1,030.4	1,138.1	380.2	378.0	492.3	30,143	34,900	39,744
Total North Central	1,512.6	1,709.1	1,876.6	605.7	629.6	766.7	52,045	57,928	64,813
South Atlantic	136.5	133.9	127.4	8.9	10.6	11.5	3,964	3,918	3,752
South Central	257.4	269.1	271.5	37.2	43.9	28.1	7,802	8,237	8,052
Western	12.9	19.2	18.2	26.5	33.2	43.4	785	1,069	1,203
Total United States	1,968.3	2,182.4	2,345.7	721.1	760.9	897.1	66,652	73,280	80,035

1/ Includes corn owned by the Government at country points.

Table 9.- Corn and oats: October 1 supply, October-December disappearance, and January 1 stocks, 1937-43

Year beginning Oct. 1	Corn: Supply Oct. 1 (grain only)	Corn: Domestic disappearance Oct.-Dec.	Corn: Net exports Oct.-Dec.	Corn: Total stocks Jan. 1	Oats: Stocks Oct. 1	Oats: Domestic disappearance Oct.-Dec.	Oats: Net exports Oct.-Dec.	Oats: Stocks Jan. 1	Total domestic disappearance	Total stocks Jan. 1
	Mil. bu.	Mil. bu.	Mil. bu.	Mil. bu.	Mil. bu.	Mil. bu.	Mil. bu.	Mil. bu.	Mil. tons	Mil. tons
Average:										
1937-41	2,793	821	9	1,968	924	202	1	721	26.2	66.7
1937	2,416	703	4	1,709	945	216	5	724	23.1	59.5
1938	2,666	780	14	1,872	888	173	2	713	24.6	63.8
1939	2,928	870	12	2,046	779	175	1/-2	606	27.2	67.0
1940	2,905	867	6	2,032	1,040	240	1/-2	802	28.1	69.7
1941	3,075	2/ 893	3/	2,182	970	2/209	3/	761	2/28.3	73.3
1942	3,377	2/1,031	3/	2,346	1,143	2/246	3/	897	2/32.8	80.0

1/ Net imports.
2/ Total disappearance.
3/ Not available for publication.

Table 10.- Production and stocks of specified byproduct feeds, December 1940 and 1941, and October-December 1942

Item	Dec. 1940	Dec. 1941	1942 Oct.	1942 Nov.	1942 Dec.
	1,000 tons	1,000 tons	1,000 tons	1,000 tons	1,000 tons
Production					
Cottonseed cake and meal	239.0	221.3	330.0	317.3	291.9
Soybean cake and meal	---	---	164.2	194.4	---
Linseed cake and meal	---	---	79.6	71.0	---
Peanut cake and meal	14.4	7.1	6.1	9.1	10.7
Gluten feed and meal	48.9	74.1	85.4	84.6	82.7
Brewers' dried grains	7.2	9.8	14.3	11.7	12.8
Distillers' dried grains	17.2	25.3	31.8	30.6	32.9
Wheat millfeeds	339.0	388.5	433.2	394.3	1/ 385.0
Stocks, end of month					
Cottonseed cake and meal	178.6	380.6	134.1	117.8	92.7
Peanut cake and meal	13.1	10.7	1.8	2.8	2.8

1/ Preliminary.

After five days return to
UNITED STATES DEPARTMENT OF AGRICULTURE
BUREAU OF AGRICULTURAL ECONOMICS
WASHINGTON, D. C.

OFFICIAL BUSINESS

Penalty for private use to
avoid payment of postage $300

RALPH H RAPER
COMM CREDIT CORP
U S DEPT OF AGRICULTURE
FNS-22-MESS WASHINGTON D C